

BOARD OF PUBLIC UTILITIES

Proposed Amendments: N.J.A.C. 14:4-8 (Renewable Energy Portfolio Standards)

Authorized By: Board of Public Utilities, Jeanne M. Fox, President, and Frederick F. Butler, Carol J. Murphy, Connie O. Hughes, and Jack Alter, Commissioners.

Authority: N.J.S.A. 48:2-13 and 48:3-49 et seq., in particular 48:3-51 and 48:3-87

Calendar Reference: See Summary below for explanation of exception to calendar requirement.

BPU Docket Number: EX 03080616

Proposal Number: PRN 2003-

A public hearing on the proposal will be held at 10:00 a.m. on October 30, 2003 at:
New Jersey Board of Public Utilities
Board Hearing Room
8th Floor, 2 Gateway Center
Newark, New Jersey

Submit comments by December 5, 2003 to:
Board of Public Utilities
Kristi Izzo, Secretary
ATTN: BPU Docket Number: EX 03080616
Two Gateway Center
Newark, New Jersey 07102

The agency proposal follows:

Summary

The New Jersey Board of Public Utilities (Board) is proposing amendments to its renewable portfolio standards (RPS) rules at N.J.A.C. 14:4-8. These rules implement provisions of the New Jersey Electric Discount and Energy Competition Act, N.J.S.A. 48:3-49 et seq. (EDECA). These amendments implement several recommendations made by Governor McGreevey's Renewable Energy Task Force (Task Force) in a report submitted to the Governor on April 24, 2003. A copy of the report can be found on the Board's website at www.bpu.state.nj.us. The Board is also developing proposed amendments to its rules on net metering and interconnection, found at N.J.A.C. 14:4-9. The Board expects to propose those amendments shortly.

N.J.A.C. 14:4-8 (Subchapter 8), requires each electric power supplier or basic generation service provider that sells electricity to retail customers in New Jersey to include in its electric energy portfolio a stated percentage of electricity generated from renewable energy sources. (A company's energy portfolio is the combined energy generated or supplied by that company.)

The rules are intended to encourage the development of renewable sources of electricity and cleaner generation technology; minimize the environmental impact of air pollutant emissions from electric generation; reduce the possible transport of air pollutant emissions; and minimize any adverse environmental impact from the deregulation of energy generation. Moreover, these proposed amendments reflect an underlying policy to both realistically accelerate the availability of renewable energy in New Jersey and to support a strategic economic development initiative to attract the companies, and the accompanying investment and jobs, that will support renewable energy industries in New Jersey and throughout the surrounding region. Because electricity generation can be a significant source of air pollution, these rules are also a component of New Jersey's efforts to meet State and Federal clean air goals.

PJM Interconnection, L.L.C. (PJM), which operates the wholesale electricity market serving New Jersey, is developing the Generation Attribute Tracking System (GATS), which will track the sale of electricity from its generation to retail suppliers. Because electricity can pass through several intermediate business entities between its generation and retail sale, and can be combined with electricity generated by several different companies, it is often difficult for an electric power supplier or basic generation service provider to determine the precise amount of electricity generated from renewable energy sources. The tracking system will enable electric power suppliers, basic generation service providers, and the Board to track how and where energy is generated, and thus to better determine whether the percentage requirements for renewable energy set forth in this subchapter have been met.

The tracking system will also support a renewable energy trading program, as provided for by EDECA at N.J.S.A. 48:3-87d(2), to provide electric power suppliers and basic generation service providers with greater flexibility in complying with the rules. The proposed amendments provide the structure for the trading program through the introduction of the concept of Renewable Energy Certificates, or RECs, addressed in N.J.A.C. 14:4-8.8.

Probably the most significant change proposed herein is the increase in the percentage of a supplier's energy portfolio that must be derived from renewable energy from 2004 onward. The existing rules at N.J.A.C. 14:4-8.3 set requirements starting at 3.25% in 2004, and increasing to 4.5% in 2008 and 6.5% in 2012. The proposed amendments increase the required percentages to 6.5% by 2008. In so doing, the proposed amendments implement a Task Force recommendation to increase the required percentage of class I renewable energy in 2008 from 2% to 4%. The proposed rules are also an important step towards meeting a goal recommended by the Task

Force, of increasing investment in solar energy so as to have 120,000 additional megawatt-hours of solar generation located in New Jersey by 2008.

In developing the regulatory framework of these proposed amendments, the Board has sought to harness and incent market forces rather than to rely on mere government intervention. While the current program of subsidies targeted to renewable energy activities in general and solar energy projects in particular will continue to be an incentive for market responses, one important goal of the RPS program is to aid in the integration of the technology into the marketplace, so as to gradually reduce the need for government intervention.

The Board recognizes that the Task Force discussed the adoption of a “goal” for solar generation by the year 2008. However, the proposed rules establish a solar electric generation requirement, reflecting the Board’s belief that more than a voluntary program will be needed to achieve the objectives of the program. The Board views the solar generation “goal” set forth in the Task Force Report as more than a target. Rather, it represents the foundation of New Jersey’s strategic initiative to attract clean energy businesses and their related jobs. The Board is concerned that a voluntary program will not create the initial market demand that is necessary to achieve this aim. In addition, the Board is concerned that a voluntary program supported by subsidies runs the risk of being counterproductive, in that it could create an impression that the clean energy industry is dependent on subsidies, and could inadvertently contribute to such an environment.

The solar REC, described in greater detail below, provides a market mechanism to capture the value of solar electric generation for purposes of the solar energy initiative. The Board believes that as market dynamics take hold and the value of solar and other renewable energy is reflected in the prices a buyer is willing to pay for a REC, subsidy levels can be significantly reduced and eventually eliminated.

The proposed rules also introduce the concept of an Alternative Compliance Payment (ACP) mechanism that is intended to provide suppliers with an additional approach to comply with the rule’s requirements. Specifically, the Board will, in consultation with an advisory committee, set an amount for an ACP for one MWh of class I or II renewable energy. A separate solar ACP (SACP) will also be established to reflect the distinct economics of that industry. A supplier may meet its RPS requirement by submitting ACP payments to the Board in the amount that equates to its RPS requirement. The establishment of the ACP program insulates a supplier from the concern that RECs may not be readily available, or that market fluctuations may at times result in REC prices unduly exceeding the true value of the attributes represented by the REC. On the other hand, the price of an ACP or SACP will reflect a policy determination that compliance should be achieved by the purchase of RECs and not through a mere “buy out”. In order to incent suppliers to purchase RECs, the rules reflect an intent that the ACP or SACP be set at a level above the proxy price determined by reference to a representative generation facility.

The proposed amendments call for the appointment of an advisory committee to assist the Board in determining the amounts of an ACP and of an SACP, and other related aspects. The President of the Board will appoint the committee, which will be comprised of members with appropriate backgrounds and experience to provide the Board with a broad range of relevant viewpoints.

The Board is mindful of the interaction of the proposed rules with the BGS auction scheduled to take place in February 2004. The Board will take all appropriate actions so that BGS bidders and other stakeholders will have as much information as practicable about the RPS requirements in advance of the auction date. Accordingly, the Board will consider appointing the ACP advisory committee prior to the final adoption of the amendments. By so doing, the Board can be in a position to establish the ACP prices at the time of the rules' final adoption. Prompt Board adoption of the ACP prices is key to enabling BGS bidders to consider the potential cost of a REC requirement when developing a bid price. In addition, timely adoption of the ACP amount will enable developers of renewable energy projects to determine the price/value of the competing compliance mechanism available to suppliers.

The framework for the solar RPS program includes a component to be implemented by the Board as part of its Clean Energy Program, outside of these proposed amendments. The Board recognizes that the ability to obtain financing for a solar project will depend, at least in part, upon whether the project can demonstrate a predictable revenue stream. Accordingly, the Board seeks to incent suppliers to enter into short term, multiple year, contracts for the purchase of RECs. Such contracts can give solar developers a revenue stream that will provide a degree of predictability regarding the revenue that will be available to satisfy a loan obligation.

The Board recognizes that a supplier may be reluctant to incur the regulatory risk attendant on multiple year supply contracts. In order to mitigate such risk, the Board intends to develop a program, funded by the Clean Energy Program, that will provide suppliers an opportunity to redeem RECs under contract in the event that the Board should at any time in the future abandon the REC program. Such redemption would be permitted if the REC program were abandoned within five years after the commencement of the contract to supply RECs.

The existing rule's required percentages for years beyond 2008 are proposed to be deleted, and updated percentages for those years will be adopted in a future rulemaking. The Task Force's recommendation of a goal for class I renewable energy of 20% in 2020 will be considered in the context of that rulemaking proceeding, which is anticipated to commence in the second half of 2004. In furtherance of this, the Board is working with Rutgers to study the impacts of the 20% requirement, and expects to conduct public outreach to ensure that all viewpoints are considered. The Board welcomes comments on the 20% goal, and though the Board will not respond to these comments in the final adoption document, any comments submitted will be carefully considered in developing further Board action on this goal.

Section-by-section description of proposed amendments:

14:4-8.1 Purpose and scope

Clarifying amendments are proposed to N.J.A.C. 14:4-8.1(a) through (c), which set forth the purposes and scope of the subchapter. Here and throughout the rule, the term "electric power supplier or basic generation service provider" is replaced with the simpler term "supplier/provider," which is defined at N.J.A.C. 14:4-8.2 to include all entities described by the longer term being replaced. In addition, the term "interim" is deleted throughout the subchapter. While the Board expects to amend the rules periodically in the future, calling the rules "interim" could lead some to believe they are less permanent than other rules, or subject to different sunset requirements, when in fact they are not.

Existing N.J.A.C. 14:4-8.1(d) is proposed for deletion and its substance is proposed to be relocated to a new section describing energy that qualifies as class I renewable energy. See proposed N.J.A.C. 14:4-8.5(b)8.

Existing N.J.A.C. 14:4-8.1(e), which provides for the Board to modify certain reporting and monitoring provisions by order upon implementation of a PJM tracking system, is proposed to be deleted and its substance relocated to proposed N.J.A.C. 14:4-8.11(j).

14:4-8.2 Definitions

Existing definitions of "Act," "New York Independent System Operator," "renewable energy," and "total retail sales" are proposed for deletion because these terms are not used in the rule as it is proposed to be amended.

The definition of "Aggregator" is amended to refer to the Board's new rules on government aggregation at N.J.A.C. 14:4-6. The phrase "for the limited purposes of these interim standards" is proposed to be deleted because it is redundant and for the reasons discussed in the summary of N.J.A.C. 14:4-8.1, above. The term "aggregator" is replaced in the definition with the term "entity" in order to avoid defining a word with itself. The change does not affect the substantive meaning of the definition. Minor clarifying amendments are also proposed.

A new definition is proposed for "alternative compliance payment," which is a payment of a certain dollar amount per megawatt hour to satisfy the requirements of the subchapter.

A new definition is proposed for "attribute." An attribute is a characteristic associated with electricity generation that can be separated from the actual electrons generated, and sold or traded separately. The REC program introduced in this proposal uses these attributes as the basis for RECs.

A sentence is added to the definition of "basic generation service," to clarify that an electric distribution company is permitted to provide this service.

Two sentences are proposed to be added to the definition of "electric power supplier" to more clearly delineate the class of entities included. The term does not include electric distribution companies because the term covers only generators of electricity when engaged in competitive, unregulated electricity supply. Electric distribution companies are public utilities that are subject to Board regulation. The final sentence excludes basic generation service (BGS) providers, and reflects statutory language found at N.J.S.A. 48:3-51.

Minor clarifying amendments are proposed to the definition of the term "biomass." In the existing rule, the definition includes the definition of "old-growth timber." For ease in locating the term, this definition is proposed to be separated from the definition of biomass. In addition, new definitions are proposed for "bioenergy crop" and "black liquor," which are both used in provisions identifying types of biomass that qualify for use in complying with this subchapter.

New definitions are proposed for "class I renewable energy" and "class II renewable energy." These terms are part of the existing definition of "renewable energy," which is proposed for deletion. Instead, a new definition of "qualified renewable energy" is proposed, which covers the types of renewable energy that may be used for compliance with the subchapter.

A new definition of "electric distribution system" is proposed, to describe the systems which provide electricity to load, or customers. An electric distribution system is distinguished from an electric transmission system, which moves electricity from the location of its generation to a distribution system. Consistent with PJM's use of this term, an electric distribution system generally carries less than 69 kilovolts of electricity.

A new definition of "energy portfolio" is proposed. The term is used in the existing rule and the proposed definition will clarify its meaning.

Amendments are proposed to the definition of the term "fuel cell." The existing definition excludes fuel cells powered by fuels that are not renewable. While energy generated by a fuel cell that is powered by a non-renewable fuel does not qualify as renewable energy under this subchapter, the definition is proposed to be amended to reflect the reality that some fuel cells are powered by non-renewable fuels. The fact that energy generated by such fuel cells cannot be used for compliance with this rule is set forth in the substantive provisions addressing class I renewable energy.

A new definition is proposed for "GATS system." The GATS system is a tracking system for attributes, which is currently under development.

A new definition is proposed for "geothermal energy," which is energy generated by a steam turbine that is driven by hot water or steam extracted from the earth's crust.

A new definition is proposed for "installed capacity obligation," for use in provisions at N.J.A.C. 14: 4-8.1(b). An installed capacity obligation is a requirement on an electricity supplier or provider to meet certain obligations under the reliability rules of the organization, PJM Interconnection, which manages the electricity grid.

Amendments are proposed to the definition of "PJM Interconnection" and a new, companion definition of "PJM region" is proposed. These changes are for clarity and do not change the meaning of the concepts involved.

A new definition is proposed for "PJM region" to provide a simple term for use in provisions referring to the area in which PJM Interconnection manages the electricity grid.

A new definition is proposed for "qualified renewable energy."

A new definition is proposed for "Renewable Energy Certificate" or "REC," to facilitate use of these certificates to comply with the subchapter, in accordance with proposed N.J.A.C. 14:4-8.8.

A new definition is proposed for "renewable fuel," for use in the provisions prohibiting the use of energy from fuel cells that are powered by non-renewable fuels.

A new definition is proposed for "reporting year," which is the period of time during which a supplier or provider must demonstrate compliance with the subchapter.

Minor clarifying amendments that do not affect meaning are proposed to the definitions of "retail choice" and "societal benefits charge."

A new definition is proposed for "solar alternative compliance payment," or "SACP." An SACP is a type of alternative compliance payment, which can be used to satisfy the solar electric generation requirements of the subchapter.

A new definition is proposed for "solar electric generation." Solar electric generation is a type of class I renewable energy that is generated using solar radiation.

A new definition is proposed for "solar REC." A solar REC is a type of renewable energy certificate that is issued based on solar electric generation, which can be used to satisfy the solar electric generation requirements of this subchapter.

The term "supplier," which means an electric power supplier or a basic generation service provider, has proved confusing because it is not clear that it also includes BGS providers. Therefore, the term "supplier/provider" is proposed to be substituted for the existing term to reduce confusion.

The definition of the term "total retail sales" is proposed for deletion, as this term is sufficiently clear without a definition.

14:4-8.3 Minimum percentage of renewable energy required

Existing provisions at N.J.A.C. 14:4-8.3 through 8.7 are proposed for deletion, to be replaced with reorganized and amended provisions that contain much of the same substance. However, the new provisions do contain significant changes, described in this summary.

Existing N.J.A.C. 14:4-8.3, which sets forth the basic percentage requirements for renewable energy, is proposed to be deleted and replaced with a new section which addresses the same subject matter. Like the existing section, the proposed new section includes a table (Table A) reflecting the required percentages, which are increased over the existing requirements to reflect the Task Force's recommendations. However, the existing table sets required percentages through 2012, whereas proposed Table A includes percentage requirements only through 2008. Further, proposed Table A includes percentage requirements for solar energy consistent with the Task Force recommendations.

Proposed N.J.A.C. 14:4-8.3(b) provides that the Board will set percentage requirements for the years following 2008, and will give at least two years notice prior to the effective date of these percentage requirements. The minimum percentages may not be lower than those for reporting year 2008.

Proposed new N.J.A.C. 14:4-8.3(c) and (d) provide for compliance with the subchapter through a new compliance mechanism – renewable energy certificates or RECs. A REC is a certificate that reflects the environmental benefits or attributes of one megawatt-hour of renewable energy generation. Further discussion of the use of RECs can be found in the summary of N.J.A.C. 14:4-8.8, which specifically addresses RECs. To meet the requirements for solar electric generation, solar RECs or ACPs must always be used. Direct supply of solar electric generation may not be used to satisfy the requirements. Solar RECs will be issued by the Board or its designee, and the Board intends to begin issuing them by the time the rules take effect. The use of class I and class II RECs is optional (that is, direct supply of electricity is also allowed), but these RECs will not be available until the GATS system is operational. The Board may in the future require RECs for satisfaction of the class I and class II renewable energy requirements, when the GATS system becomes operational.

Proposed new N.J.A.C. 14:4-8.3(e) and (f) provide for compliance with the subchapter through direct supply of electricity, or through another new compliance option – an alternative compliance payment or ACP. A supplier/provider may pay an ACP (or a solar ACP) to make up for any shortfall in energy or RECs. Further discussion of the use of ACPs and SACPs can be found in the summary of N.J.A.C. 14:4-8.10, which specifically addresses ACPs and SACPs.

Proposed N.J.A.C. 14:4-8.3(g) sets forth a hierarchy of the types of renewable energy, with solar electric generation being the most versatile for meeting the requirements in Table A, because it can be used to satisfy requirements for any of the three types of renewable energy – solar electric generation, class I renewable energy, or class II renewable energy. Class I renewable energy, followed by class II renewable energy, both follow solar in order of versatility.

14:4-8.4 Compliance with solar electric generation requirements

Existing N.J.A.C. 14:4-8.4, which addresses reporting, and the types of energy that qualify as class I and II renewable energy, is proposed for deletion. Most of its substance is proposed to be distributed among new sections addressing class I renewable energy (N.J.A.C. 14:4-8.5), class II renewable energy (N.J.A.C. 14:4-8.6), and reporting requirements (N.J.A.C. 14:4-8.11). However, three provisions are proposed for deletion, as described below.

Provisions found in existing N.J.A.C. 14:4-8.4(e), which address the method the Board will use to calculate the amount of renewable energy that can be used for compliance with this subchapter, when the energy was generated by a combination of different fuels, are proposed for deletion. The rules will no longer allow use of such energy for compliance with these rules, due to difficulties with verifying generation and calculating the amount of renewable energy produced.

Existing N.J.A.C. 14:4-8.4(g), which requires quarterly reporting if a supplier fails to comply with the percentage requirements, is proposed for deletion. This will no longer be needed, as a non-complying supplier will be required to purchase RECs or pay ACPs to make up for any shortfalls in energy actually delivered.

Existing N.J.A.C. 14:4-8.4(h), which sets forth a list of environmental issues the Board and NJDEP will consider during the first 18 months the subchapter is in effect, is proposed for deletion. Since these issues are general policy issues that both the Board and NJDEP constantly consider in all actions concerning renewable energy, and since this time period has expired, there is no further need for this provision.

Proposed new N.J.A.C. 14:4-8.4(a) requires that the solar electric generation requirements be met through use of solar RECs. This is necessary because of the difficulties of tracking and verifying solar generation, and in order to help stimulate trading of solar energy.

Proposed new N.J.A.C. 14:4-8.4(b) prohibits the use of certain types of solar electric generation to meet the solar requirements in Table A. As in the existing rules at N.J.A.C. 14:4-8.4(c)5 and 8.4(d), these provisions seek to prevent double counting of energy.

14:4-8.5 Compliance with class I renewable energy requirements

Existing N.J.A.C. 14:4-8.5, which addresses calculation methodology, is proposed for deletion. Most of its substance is proposed to be relocated to proposed new N.J.A.C. 14:4-8.10.

Proposed new N.J.A.C. 14:4-8.5 sets forth the types of energy that qualify as class I renewable energy for purposes of complying with the percentage requirements in Table A in N.J.A.C. 14:4-8.3. Proposed N.J.A.C. 14:4-8.5(b) through (f), which list the types of energy that qualify as class I renewable energy, contain the substance of existing N.J.A.C. 14:4-8.4(c)2.

Proposed N.J.A.C. 14:4-8.5(g) contains procedures for obtaining an NJDEP determination that an electric generating facility meets certain environmental standards. These procedures are similar to the existing procedure, set forth at N.J.A.C. 14:4-8.4(c)2i(3), but are set forth in more detail in the proposed rules, and the determination is named a "biomass sustainability determination". The Board and NJDEP will work closely together to ensure that these determinations are issued efficiently and promptly.

Proposed new N.J.A.C. 14:4-8.5(h) provides that, if a biomass sustainability determination is required for electricity, the determination shall be obtained prior to generating the electricity. Thus, if a supplier/provider generates electricity using biomass that would qualify for a biomass sustainability determination, but delays in obtaining the determination, electricity generated prior to the NJDEP determination could not be used as class I renewable energy for complying with these rules.

Proposed new N.J.A.C. 14:4-8.5(i) and (j) require that supplier/providers who obtain a NJDEP biomass sustainability determination keep certain documentation, and follow procedures to notify the Board if changes are made at the biomass generation plant.

Proposed new N.J.A.C. 14:4-8.5(k) contains provisions found at existing N.J.A.C. 14:4-8.4(c)2i(2), prohibiting use of energy from combustion of certain types of fuels.

14:4-8.6 Compliance with class II renewable energy requirements

Existing N.J.A.C. 14:4-8.6, which addresses record keeping and verification, is proposed for deletion. Existing N.J.A.C. 14:4-8.6(a), which provides for Board audit of documents pertaining to compliance with this subchapter, is proposed for deletion and its substance is proposed to be relocated at N.J.A.C. 14:4-8.11(g). Existing N.J.A.C. 14:4-8.6(b) pertains to rate cases and is therefore proposed for deletion.

Proposed new N.J.A.C. 14:4-8.6 contains the substance of provisions found in the existing rules at N.J.A.C. 14:4-8.4(c)3, which describe the types of renewable energy that qualify as class II renewable energy for purposes of complying with the percentage requirements of Table A in N.J.A.C. 14:4-8.3, and require an NJDEP determination regarding the environmental compliance of certain resource recovery facilities. The proposal provides additional detail regarding the information required by the NJDEP for

the determination, and the determination is named an "environmental compliance determination".

Proposed new N.J.A.C. 14:4-8.6(g) and (h) require that supplier/providers who obtain a NJDEP environmental compliance determination keep certain documentation, and follow procedures to notify the Board if changes are made at the resource recovery facility.

Proposed new N.J.A.C. 14:4-8.6(i) allows use of solar electric generation or class I renewable energy to satisfy class II renewable energy requirements.

14:4-8.7 Requirements that apply to both class I and class II renewable energy

Existing N.J.A.C. 14:4-8.7, which provides for the Board to adopt a renewable energy trading program in the future, is proposed for deletion.

Proposed new N.J.A.C. 14:4-8.7 sets forth requirements that apply to all renewable energy. Proposed new N.J.A.C. 14:4-8.7(b) requires that class I and class II renewable energy must be generated within or delivered into the PJM region. This is slightly more restrictive than the existing rules, which allow some energy delivered to the control area under the jurisdiction of the New York Independent System Operator (ISO). This proposed change will prevent double counting of the renewable energy. Electricity sold into the New York spot market, including electricity from renewable energy sources, is included in the calculation of the fuel mix average for that control area. Thus, renewable energy delivered into the New York ISO control area could be counted towards the New Jersey RPS percentage requirements.

Furthermore, very few retail customers will be affected by excluding energy delivered to the NY ISO from the rules. At the time of the adoption of the existing standards, a greater percentage of retail customers was served electricity from the New York control area. However, at present, very few New Jersey customers remain in the jurisdiction of the NY Power Pool (approximately 40 megawatts).

Proposed new N.J.A.C. 14:4-8.7(c) requires that renewable energy generated outside of the PJM region, but delivered into the PJM region, must be generated at a facility built after January 1, 2003. This will encourage additional renewable energy generation capacity, rather than just the transfer of the environmental attributes from existing generation sources, in states without other significant incentives to create such additional renewable energy generation capacity.

Proposed new N.J.A.C. 14:4-8.7(d) contains limits on double counting found in existing N.J.A.C. 14:4-8.4(d). Because most of the renewable energy claimed by suppliers as fulfilling the RPS requirements will be scheduled and delivered into the PJM markets, allowing suppliers to rely on a percentage of the spot market average to discharge their renewable energy requirement could result in counting the renewable energy in more than one supplier's annual energy portfolio. Therefore, these

requirements may not be fulfilled by ascribing a portion of spot market purchases as renewable energy.

14:4-8.8 Renewable Energy Certificates (RECs)

Proposed new N.J.A.C. 14:4-8.8 provides an option for compliance with the required percentages in Table A through use of renewable energy certificates or RECs. A REC is a certificate representing the environmental benefits of one megawatt-hour of electricity generated by a renewable energy facility. To quote from Recommendation 5 in the Task Force Report:

Under such a program, the renewable attribute of the energy is 'unbundled' from the energy itself; that is, a renewable energy generator can sell its energy to one energy supplier and sell the renewable attribute certificate for that energy to a separate energy supplier, which would then use that certificate toward meeting its RPS obligation. The state should support the development of such a program by the PJM Generation Attribute Tracking System (GATS) Working Group. This unbundled certificate program will allow New Jersey to meet its progressive renewable energy goals in an efficient, enforceable, market-based manner that allows the trading of attributes as certificates.

RECs for class I and class II renewable energy will be issued and tracked by PJM using the GATS, which is currently under development. Therefore, the option of complying with class I and class II renewable energy requirements with RECs will not be available until the GATS system is operational, unless the Board develops a program to itself issue RECs for those requirements. RECs for solar electric generation will be issued by the Board, beginning in 2004, in order to promote the objectives described above.

The proposed new N.J.A.C. 14:4-8.8 specifies the term of a REC, and minimum information it will include. All RECs used for compliance during a particular reporting year must be based on energy generated during that reporting year. The section also specifies that the Board will retire each REC submitted for compliance with this subchapter, to ensure that it cannot be reused.

14:4-8.9 Board issuance of solar RECs

Proposed new N.J.A.C. 14:4-8.9(a) provides for Board issuance of solar RECs. Until the GATS system is in place, the Board will issue RECs for solar electric generation only. However, once the GATS system is in place, the Board may allow use of PJM solar RECs in addition, or in place of, Board-issued solar RECs.

Proposed N.J.A.C. 14:4-8.9(b) through (d) describe the Board's process for issuing solar RECs, including:

- The Board may designate a third party to issue RECs;
- RECs will only be issued only for generation occurring after May 31, 2004, to coincide with the beginning of the first reporting year of the program;

- To measure solar electric generation for issuance of RECs, the Board will require metering, except for systems of less than 10 kilowatts, which may be measured through estimates and monitoring protocols;
- RECs will be issued only in whole units.

Proposed N.J.A.C. 14:4-8.9(e) and (f) set forth the procedures for requesting issuance of RECs and a deadline for Board issuance of RECs within 30 days after a request. In order to ensure that solar RECs reflect real solar electric generation, the Board or its designee will require submittal of detailed information on the generation facility and its operation. In addition, the Board or its designee will conduct inspections of facilities as necessary to verify generation, and will charge appropriate fees reflecting the level of effort necessary to verify generation.

Proposed N.J.A.C. 14:4-8.9(g) prohibits issuance of a REC based on the types of solar electric generation that could not be used to comply with this subchapter under proposed N.J.A.C. 14:4-8.4(b).

14:4-8.10 Alternative compliance payments (ACPs and SACP)

Proposed new N.J.A.C. 14:4-8.10 provides another option for compliance, through an alternative compliance payment or ACP. In its Recommendation 7, the Task Force stated that:

... retail suppliers should have the opportunity to achieve compliance with the RPS through an alternative compliance payment (ACP). The ACP would allow retail suppliers to make a payment of a dollar amount per MWh to cover any shortfall in the supplier's purchase of renewable certificates. ACP levels should be set at an amount higher than the incremental cost of eligible renewable generation. The BPU should set ACP levels on a periodic basis and with adequate notice in order to provide greater certainty to retail suppliers and to protect the interests of ratepayers. The ACP will protect suppliers and their retail customers from an unanticipated failure of the market to yield enough renewable energy to meet the RPS requirements or from an unanticipated increase in the cost of renewable certificates. The ACP should not be used, however, as a permanent substitute for suppliers meeting their RPS requirements, but rather a temporary alternative form of compliance due to unexpected circumstances. All ACP funds should be used for the development and use of renewable energy through the New Jersey Clean Energy Program.

The Board, in consultation with a Board-appointed advisory committee, will set and maintain the amount of an ACP (and a SACP, for solar electric generation requirements) at an amount that will encourage suppliers to meet the percentage requirements through delivery of renewable energy or RECs rather than use of an ACP or SACP.

Proposed N.J.A.C. 14:4-8.10(e) provides that the Board will use the ACP and SACP monies to fund clean energy projects. Thus, the ACPs will support clean energy facilities

and will help to lower the future cost of buying renewable energy or RECs from those felicities.

14:4-8.11 Demonstrating compliance, reporting and record keeping

Proposed new N.J.A.C. 14:4-8.11 contains some of the substance of the reporting requirements found at existing N.J.A.C. 14:4-8.4, and proposed new provisions. The new provisions change the date of the required annual report from March 1st to September 1st, and create the concept of a "reporting year," which runs from June 1st to May 31st each year. The reporting year has been set to be consistent with the delivery of energy to retail customers, as determined by the Board-approved basic generation service (BGS) procurement process.

Proposed N.J.A.C. 14:4-8.11 requires that the annual report not only state whether the required amounts of renewable energy were supplied, but that if not, the RECs and/or ACPs necessary to make up the short fall must be submitted simultaneously with the annual report. Because the supplier/provider can calculate the amount of energy supplied and can itself determine whether additional RECs and/or ACPs are needed, there is no need for a waiting period before these are submitted.

Existing requirements carried over in the proposal include the basic requirement for annual reporting of the information necessary to calculate total electricity supplied and the percentage of renewable energy supplied, found in the existing rules at N.J.A.C. 14:4-8.4(c)1 through 4. In addition, requirements for documentation of generation and delivery, found in existing at N.J.A.C. 14:4-8.4(f), are included in N.J.A.C. 14:4-8.11.

14:4-8.12 Penalties

The penalty provisions found in existing N.J.A.C. 14:4-8.8 are recodified as N.J.A.C. 14:4-8.12. Existing provisions allowing for a supplier to make up a previous year's shortfall are proposed for deletion. They will no longer be needed because a noncomplying supplier will be required to use RECs or ACPs to make up for such a shortfall, in accordance with proposed new N.J.A.C. 14:4-8.11.

Social Impact

The proposed amendments will have a positive social impact, in that they will further the goals of EDECA and will nurture the renewable energy industry in the New Jersey and the surrounding region. The proposed new provisions in subchapter 8 for RECs and ACPs will provide flexibility, making it easier to comply with the RPS requirements and helping to develop the growing market for renewable energy. This will contribute to New Jersey's economy and employment outlook, as well as to local and national energy diversification and energy independence.

Economic Impact

The proposed amendments to subchapter 8 will likely have some economic impact on supplier/providers, in that there will be an additional cost to them in locating and obtaining the energy or RECs required. This impact will likely cause a minimal indirect economic impact on consumers. The proposed percentage increases, including the solar requirement, are projected to increase the average household's electricity bill by approximately \$1.00 in 2004. However, these impacts are amply compensated for by the benefits of the amendments. Energy generation is a major contributor to air pollution, and the amendments will increase the rules' beneficial effect on air quality. Further, the proposed amendments will also have positive economic impacts on the nascent alternative energy industry in New Jersey. By stimulating more renewable energy generation, the amendments will foster the growth of related industries and markets. As discussed above, the amendments are part of a strategic economic development initiative to attract the companies, and the accompanying investment and jobs, that will support renewable energy industries in New Jersey and throughout the surrounding region.

The fees and charges authorized at N.J.A.C. 14:4-8.9(e), for functions performed by the Board in relation to issuance of solar RECs, will likely have a minor economic impact on persons who request issuance of RECs based on their solar electric generation. These fees and charges will reflect the cost of the work necessary for the Board to verify the solar electric generation and ensure compliance with the subchapter and any other applicable requirements. It is likely that the fees and charges will vary for each applicant for RECs, because many factors affect the amount of resources the Board must expend to verify generation and ensure compliance. It is presumed that a person requesting issuance of solar RECs will evaluate the likely value of the solar RECs in relation to the cost of the Board's work to verify the generation and ensure compliance. If the value of the RECs does not justify the expense, the person can refrain from requesting issuance of RECs, and can use the solar electric generation in some other way, perhaps by selling it directly, or perhaps by applying to another agency or organization that may issue RECs or similar instruments for other purposes.

Federal Standards Statement

Executive Order No. 27 (1994) and N.J.S.A. 52:14B-1 et seq. require State agencies that adopt, readopt or amend State regulations that exceed any Federal standards or requirements to include in the rulemaking document a Federal Standards Analysis. N.J.A.C. 14:4-8 is not promulgated under the authority of, or in order to implement, comply with or participate in any program established under Federal law or under a State statute that incorporate or refers to Federal law, Federal standards, or Federal requirements. Accordingly, Executive Order No. 27 (1994) and N.J.S.A. 52:14B-1 et seq. do not require a Federal Standards Analysis for these proposed amendments.

Jobs Impact

The Board anticipates that these proposed amendments will have a positive impact on jobs in New Jersey. As stated above, these amendments are part of New Jersey's strategic initiative to attract clean energy businesses and their related jobs to the State. There will be a direct positive impact on jobs, in that there will be an increase in jobs for designers, builders, installers and operators of renewable energy equipment. In addition, there will be an indirect positive impact on jobs, in that the development of a market for the trading of solar RECs, and eventually of class I and class II renewable energy RECs, will also increase jobs.

Agriculture Industry Impact

The Board does not anticipate that the proposed amendments will have any impact on the agriculture industry in New Jersey. However, it is possible that the improved biomass provisions in subchapter 8 may encourage the growing of bioenergy crops for use as biomass in fueling electricity generators.

Regulatory Flexibility Statement

The proposed amendments to subchapter 8 will not impose any record keeping, reporting or other compliance requirements on small businesses because it does not apply to any small businesses. A small business, as defined in the New Jersey Regulatory Flexibility Act, N.J.S.A. 52:14B-16 et seq., is a business that has fewer than 100 employees. Subchapter 8 applies only to utilities and third party electricity suppliers. The Board is not aware of any utilities or third party electricity suppliers that meet the definition of a small business.

Smart Growth Impact

The Board anticipates that the proposed amendments will have no impact on either the achievement of smart growth or the implementation of the State Development and Redevelopment Plan. The State Plan is intended to "provide a coordinated, integrated and comprehensive plan for the growth, development, renewal and conservation of the State and its regions" and to "identify areas for growth, agriculture, open space conservation and other appropriate designations." N.J.S.A. 52:18A-199a. Smart growth is based on the concepts of focusing new growth into redevelopment of older urban and suburban areas, protecting existing open space, conserving natural resources, increasing transportation options and transit availability, reducing automobile traffic and dependency, stabilizing property taxes, and providing affordable housing." These rules apply uniformly Statewide and the Board does not expect that they will affect the location of future development. Therefore, the proposed amendments will not impact smart growth or the State Plan.

Full text of the proposed amendments follows.

SUBCHAPTER 8. RENEWABLE ENERGY PORTFOLIO STANDARDS

14:4-8.1 Purpose and scope

(a) [Pursuant to the provisions of the Electric Discount and Energy Competition Act (The "Act") (N.J.S.A. 48:3-87), each electric power supplier or basic generation service provider who] Each supplier/provider, as defined at N.J.A.C. 14:4-8.2, that sells electricity to retail customers in [this State] New Jersey, shall include in its electric energy portfolio electricity generated from renewable energy sources. [These interim renewable portfolio energy standards ("interim standards") are] This subchapter is designed to encourage the development of renewable sources of electricity and new, cleaner generation technology; minimize the environmental impact of air pollutant emissions from electric generation; reduce possible transport of emissions and minimize any adverse environmental impact from deregulation of energy generation.

(b) [These interim standards pertain to] This subchapter governs the retail electricity sales of each [electric power supplier and basic generation service provider] supplier/provider, as defined in N.J.A.C. 14:4-8.2. [These interim standards pertain to electricity retail sales and not to] This subchapter does not govern installed capacity obligations , as defined at N.J.A.C. 14:4-8.2 .

(c) [These interim standards do] This subchapter does not apply to a private or government aggregator that contracts for electric generation service or electric related services, either separately or bundled, for its own facilities or on behalf of other business and residential customers in this State. [These standards do] This subchapter does not apply to an energy agent [that arranges the sale of retail electricity or electric related services between government aggregators or private aggregators and suppliers] , as defined at N.J.A.C. 14:4-8.2. [The electric power supplier(s) who] A supplier/provider that is contractually obligated to sell electricity to [the] an aggregator shall comply with [these interim standards] this subchapter by including the [aggregated] amount sold to the aggregator as part of its energy portfolio.

[(d) For the limited purposes of these interim standards, electricity generated from Class I renewable energy projects funded by the societal benefits charge (SBC) shall qualify as Class I renewable energy that can be used to meet the renewable energy portfolio standards percentage requirements. Specifically, Class I renewable energy generated from projects funded by the SBC, as a result of the findings of the Comprehensive Resources Analysis (CRA) Proceeding, may be used to meet the requirements herein, unless and until the Board determines otherwise.

(e) Certain elements of these interim standards, particularly pertaining to reporting requirements for electric power suppliers and basic generation service providers, may be subject to elimination or modification by an order of the Board, to the extent that a tracking system is implemented by an independent system operator and/or an environmental disclosure program administrator.]

14:4-8.2 Definitions

The following words and terms, when used in this subchapter, shall have the meanings given below, unless the context clearly indicates otherwise:

["Act" means the "Electric Discount and Energy Competition Act" (N.J.S.A. 48:3-49 et seq.).]

"Aggregator" means either of the following:

1. [A governmental entity, subject to the requirements of the "Local Public Contracts Law," P.L. 1971, c.198 (N.J.S.A. 40A:11-1 et seq.), the "Public School Contracts Law," N.J.S.A. 18A:18A-1 et seq., or the "County College Contracts Law," P.L. 1982, c.189 (N.J.S.A. 18A:64A-25.1 et seq.), that enters into a written contract with a licensed electric power supplier(s) for electric generation service or electric related service either separately or bundled with other services, for its own facilities, the use of other government aggregators or on behalf of business and residential customers within its territorial jurisdiction;] A government aggregator, as that term is defined in the Board's rules on government energy aggregation programs at N.J.A.C. 14:4-6; or
2. A private non-government [aggregator] entity that is a duly [-] organized business or non-profit organization authorized to do business in [this State] New Jersey and that enters into a contract with a duly licensed electric power supplier for the purchase of electric energy and capacity, on behalf of multiple end-use customers by combining the loads of those customers.

[For the limited purposes of these interim standards, a] A government or private aggregator, as well as its customers, shall be considered to be retail customers, as defined herein.

"Alternative compliance payment" or "ACP" means a payment of a certain dollar amount per megawatt hour, which a supplier/provider may submit in lieu of supplying the class I or class II renewable energy required under Table A in N.J.A.C. 14:4-8.3.

"Attribute" means a characteristic associated with electricity, such as its generation date, facility geographic location, unit vintage, emissions output, fuel, state program eligibility, or other characteristic that can be identified, accounted, and tracked.

"Basic generation service" means electric generation service that is provided to any customer that has not chosen an [alternative] electric power supplier, as defined herein, whether or not the customer has received offers [as to] for competitive supply options[.]; including, but not limited to, any customer that cannot obtain such service from an electric power supplier for any reason, including non-payment for services. Basic generation service is not a competitive service and shall be fully regulated by the Board. An electric distribution company, as defined herein, may provide basic generation service.

"Biomass" [means, for the limited purposes of these interim standards, as it is defined] has the same meaning as that assigned to this term in Executive Order 13134,

published in the Federal Register on August 16, 1999. Executive Order 13134 defines biomass as ". . . any organic matter that is available on a renewable or recurring basis (excluding old-growth timber), including dedicated energy crops and trees, agricultural food and feed crop residues, aquatic plants, wood and wood residues, animal wastes, and other waste materials. [Old-growth timber means timber of a forest from the late successional stage of forest development. The forest contains live and dead trees of various sizes, species, composition, and age class structure. The age and structure of old growth varies significantly by forest type and from one biogeoclimatic zone to another.]"

"Bioenergy crop" means plants cultivated and harvested specifically for use as fuel for the purpose of generating electricity.

"Black liquor" means a viscous liquid containing inorganic chemicals and organic material such as lignin and aliphatic acids, which is separated from wood during chemical pulping.

. . .

"Class I renewable energy" means electric energy produced from solar technologies, photovoltaic technologies, wind energy, fuel cells powered by renewable fuels, geothermal technologies, wave or tidal action, and/or methane gas from landfills or a biomass facility, provided that the biomass is cultivated and harvested in a sustainable manner. Types of class I renewable energy that qualify for use in meeting the requirements of this subchapter are set forth at N.J.A.C. 14:4-8.5.

"Class II renewable energy" means electric energy produced at a resource recovery facility or hydro power facility, provided that such facility is located where retail competition is permitted and provided further that the Commissioner of Environmental Protection has determined that such facility meets the highest environmental standards and minimizes any impacts to the environment and local communities. Types of class II renewable energy that qualify for use in meeting the requirements of this subchapter are set forth at N.J.A.C. 14:4-8.6.

"Electric distribution company" or "EDC" has the same meaning as is assigned to this term at N.J.A.C. 14:4-9.2.

"Electric power supplier" means a person or entity that is duly licensed by the Board to offer and to assume the contractual and legal responsibility to provide electric generation service to retail customers [, and] . This term includes load serving entities, marketers and brokers that offer or provide electric generation service to retail customers. An electric power supplier may provide basic generation service, as defined herein. However, the term excludes an electric public utility that provides electric generation service only for the purpose of providing basic generation service, as defined herein.

...

"Energy portfolio" means all of the electrical energy supplied by a particular electric power supplier or basic generation service provider to New Jersey retail customers.

"Fuel cell" means an electrochemical device that converts chemical energy in a hydrogen or hydrogen-rich fuel directly into electricity, [heat and water] without combustion. [A fuel cell may be powered by hydrocarbon-based fuel sources including methanol, ethanol, landfill and digester gas, and biomass gas. The fuel cell may not be powered by any fossil fuels, including natural gas.]

"GATS system" means the Generation Attribute Tracking System that, as of {effective date of these rules} is under development by PJM Interconnection.

"Geothermal energy" means energy generated by a steam turbine, driven by hot water or steam extracted from geothermal reservoirs in the earth's crust.

"Installed capacity obligation" means the requirement for an electric power supplier or basic generation service provider to obtain an amount of electrical generation capacity to meet load service obligations under the reliability rules of PJM Interconnection. Installed capacity includes the generation capacity which a company considers part of its own electric system, including wholly-owned units, jointly-owned units, non-utility generation (NUGs), and purchases.

...

["New York Independent System Operator" ("NY ISO") means the independent system operator that coordinates the physical supply of electricity throughout the service territories of New York state utilities and maintains reliability of the bulk power system.]

"Old-growth timber" means wood or plant matter taken from a forest in the late successional stage of forest development, including plant matter taken from the forest floor. Late successional forests contain live and dead trees of various sizes, species, composition, and age class structure. The age and structure of old-growth timber varies significantly by forest type and from one biogeoclimatic zone to another.

"PJM Interconnection [, L.L.C." or "PJM ISO" means the entity that operates the wholesale electric power market in the "PJM Region" as that term is defined in the Amended and Restated Operating Agreement of PJM Interconnection, L.L.C., as that Agreement is amended from time to time. The Operating Agreement can be obtained on the PJM website at www.pjm.com, or by writing to PJM Interconnection, L.L.C. -- Legal Department, 955 Jefferson Avenue, Norristown, PA, 19403.] means the regional transmission organization (RTO) that coordinates the movement of wholesale electricity in the PJM region, as defined herein.

"PJM region" means the area within which the movement of wholesale electricity is coordinated by PJM Interconnection, as defined herein. ("PJM" stands for Pennsylvania-Jersey-Maryland.) The PJM region is described in the Amended and Restated Operating Agreement of PJM Interconnection. The Operating Agreement can be obtained on the PJM Interconnection website at www.pjm.com, or by writing to PJM Interconnection, Legal Department, 955 Jefferson Avenue, Norristown, PA, 19403. As of {effective date of this rule}, the PJM region includes all or parts of Delaware, Maryland, New Jersey, Ohio, Pennsylvania, Virginia, West Virginia, and the District of Columbia.

["Renewable energy," for the limited purposes of these interim standards, means electric energy that is produced from a source of energy that belongs to one of the following two classes:

1. "Class I renewable energy" means electric energy produced from solar technologies, photovoltaic technologies, wind energy, fuel cells, geothermal technologies, wave or tidal action, and methane gas from landfills or a biomass facility, provided that the biomass is cultivated and harvested in a sustainable manner; or
2. "Class II renewable energy" means electric energy produced at a resource recovery facility or hydro power facility, provided that such facility is located where retail competition is permitted and provided further that the Commissioner of Environmental Protection has determined that such facility meets the highest environmental standards and minimizes any impacts to the environment and local communities.]

"Qualified renewable energy" means electricity that may be used in complying with the minimum portfolio requirements set forth at N.J.A.C. 14:4-8.3 for class I renewable energy, including solar electric generation requirements, and/or class II renewable energy. Provisions governing the types of energy that qualify as class I renewable energy, solar electric generation, and class II renewable energy, are set forth at N.J.A.C. 14:4-8.4, 8.5, and 8.6 respectively.

"Renewable Energy Certificate" or "REC" means a certificate representing the environmental benefits or attributes of one megawatt-hour of generation from a generating facility that meets the requirements of this subchapter. There are three kinds of RECs – class I RECs, which represent the environmental benefits or attributes of one megawatt-hour of class I renewable energy generation; class II RECs, which represent the environmental benefits or attributes of one megawatt-hour of class II renewable energy generation; and solar RECs, which represent the environmental benefits or attributes of one megawatt-hour of solar electric generation.

"Renewable fuel" means a fuel that is naturally regenerated over a short time scale and is either derived from the sun (such as thermal, photochemical or photoelectric), or from other natural sources such as wind, hydropower, geothermal and tidal energy, or photosynthetic energy stored in biomass. This term does not include a fossil fuel, a waste product from a fossil source, or a waste product from an inorganic source.

"Reporting year" means the twelve-month period from June 1st through May 31st. A reporting year shall be numbered according to the calendar year in which it begins, so that reporting year 2004 runs from June 1, 2004 through May 31, 2005.

"Retail choice" or "retail competition" means the ability of retail customers to [shop for] purchase electric generation service from electric power suppliers [or opt to receive] , or to choose basic generation service [and] , as defined herein. This term also includes the ability of [an] any electric power supplier, upon meeting basic licensing requirements, to offer electric generation service to retail customers.

"Retail customer" means any person that is an end user of electricity and is connected to any part of the transmission and distribution system within an electric public utility's service territory [within this State] in New Jersey. [For the limited purposes of these interim standards, this] This term includes an aggregator, as well as the customer of a private sector aggregator or government aggregator, but does not include a wholesale customer.

"Societal benefits charge" means a charge imposed by an electric public utility, at a level determined by the Board, [pursuant to, and] in accordance with [,] N.J.S.A. 48:3-60.

"Solar alternative compliance payment" or "SACP" means a payment of a certain dollar amount per megawatt hour, which a supplier/provider may submit in lieu of complying with the solar electric generation requirements in Table A in N.J.A.C. 14:4-8.3.

"Solar electric generation" means creation of electricity using a system that employs solar radiation to produce energy that powers an electric generator. Solar electric generation is a type of class I renewable energy.

"Solar REC" means a type of REC, as defined herein, issued by the Board or its designee, which represents the environmental benefits or attributes of one megawatt-hour of solar electric generation, as defined herein.

"Supplier/provider" means an electric power supplier or a basic generation service provider, as those terms are defined herein.

["Total retail sales" or "total energy load" means the total amount of kilowatt hours of electricity that an electric power supplier or a basic generation service provider sells to retail customers, including electricity aggregators, in this State during a given year.]

[14:4-8.3 Implementation schedule

(a) Each electric power supplier or basic generation service provider selling electricity to retail customers in this State shall have in its annual electric energy portfolio a minimum amount of electricity generated from Class I and Class II renewable energy sources, as defined in N.J.A.C. 14:4-8.2, as a percentage of the total energy load supplied to New Jersey retail customers according to the following schedule:

Year	Class I	Plus	Class I or II	Total
2001 (September-December)	0.5%		2.5%	3.0%
2002	0.5%		2.5%	3.0%
2003	0.75%		2.5%	3.25%
2004	0.75%		2.5%	3.25%
2005	0.75%		2.5%	3.25%
2006	1.0%		2.5%	3.5%
2007	1.5%		2.5%	4.0%
2008	2.0%		2.5%	4.5%
2009	2.5%		2.5%	5.0%
2010	3.0%		2.5%	5.5%
2011	3.5%		2.5%	6.0%
2012 and beyond	4.0%		2.5%	6.5%

(b) In the year 2001, at least one-half of one percent of the kilowatt hours sold in this State to retail customers from September 1st through December 31st by each electric power supplier and each basic generation service provider shall be from Class I renewable energy sources, as defined herein and specified in the above table (Column 2, "Class I"). At a minimum, an additional two and one-half percent of kilowatt-hours of electricity sold to retail customers from September 1st through December 31st by each electric power supplier and each basic generation service provider shall be from Class I or Class II renewable energy sources, or any combination thereof (Column 3, "Class I or Class II").

(c) For each successive year thereafter, a minimum percentage of the kilowatt hours sold in this State from January 1st through December 31st by each electric power supplier and each basic generation service provider shall be from Class I renewable energy sources, beginning at one-half of one percent in 2002 and increasing to four percent of the kilowatt hours sold in this State by 2012 and remaining at a minimum of four percent for each successive year thereafter (Column 2, "Class I"). In addition, no less than two and one-half percent of the kilowatt hours of electricity sold in this State by each electric power supplier and each basic generation service provider to retail customers from January 1st to December 31st shall be from Class I or Class II renewable energy sources, or any combination thereof (Column 3, "Class I or Class II"). Thus, by the year 2012, each electric power supplier and each basic generation service provider shall include at least a total of six and one-half percent of Class I and Class II renewable energy as part of his electric energy portfolio.

(d) For each year beyond the year 2012, the minimum percentage of energy required from Class I and Class II renewable sources shall remain fixed at four percent from Class I renewable energy plus an additional two and one-half percent from either Class I renewable energy or Class II renewable energy or a combination thereof, for a total of six and one-half percent of the electric power supplier's or basic generation service provider's annual electric energy portfolio.

14:4-8.4 Reporting requirements of the interim standards

(a) Pursuant to the mandates embodied in N.J.S.A. 48:3-87, the interim standards for renewable energy require that each electric power supplier or basic generation service provider demonstrate, beginning in 2002, that the percentage of Class I and Class II renewable energy in the electric power supplier's or basic generation service provider's electric energy portfolio for the preceding calendar year was at least as great as the required minimum percentages set forth in the table in N.J.A.C. 14:4-8.3.

(b) By March 1st of each year, beginning March 1, 2002, each electric power supplier and basic generation service provider shall file an annual report with the Board of Public Utilities, demonstrating that the electric power supplier's or basic generation service provider's electric energy portfolio met the percentage requirements for Class I and Class II renewable energy contained in N.J.A.C. 14:4-8.3 for the preceding calendar year (January through December).

(c) The annual report shall contain the following:

1. The electric power supplier's or basic generation service provider's total amount of kilowatt hours sold to retail customers in New Jersey during the preceding year;
2. The amount of energy sold to retail customers in New Jersey during the preceding year that was generated from Class I renewable energy sources, expressed as a number of kilowatt hours; and the percentage of the electric power supplier's or basic generation service provider's total retail sales that this amount represents.
 - i. For the limited purposes of these interim standards, electric energy produced from biomass, either by the burning of captured methane gas derived from biomass or the direct firing of biomass, shall qualify as a Class I renewable energy source provided that the biomass is cultivated and harvested in a sustainable manner.
 - (1) Electric energy produced from combustion of the following materials shall qualify as a Class I renewable source that is produced from biomass that is cultivated and harvested in a sustainable manner in accordance with a management plan approved by the environmental agency in the state in which the wood is grown:
 - (A) Gas from the anaerobic digestion of food waste and sewage sludge;
 - (B) Gas from the anaerobic digestion of other biomass fuels, including bioenergy crops and agricultural waste, provided the electric power supplier or basic generation service provider maintains documentation that demonstrates that the biomass was cultivated and harvested in a sustainable manner;
 - (C) A bioenergy crop, provided that the electric power supplier or basic generation service provider maintains documentation that demonstrates that the crop was cultivated and harvested in a sustainable manner;
 - (D) Any of the following types of wood, provided that the wood is clean and untreated and that the electric power supplier or basic generation service

provider maintains documentation that demonstrates that the wood was cultivated and harvested in a sustainable manner:

- I. Wood produced at a biomass energy plantation;
- II. Wood from the thinning or trimming of trees and/or from a forest floor, except wood from old growth forests;
- III. Ground wood, produced through the grinding or shredding of pallets and other scrap wood (and that the removal of nails and any other metal) at a recycling facility that is classified as a Class B recycling facility by the New Jersey Department of Environmental Protection's Bureau of Landfill and Recycling Management or an equivalent recycling facility approved by the state environmental agency in which the facility is located; or
- IV. Wood shavings and scrap from a lumberyard or a paper mill;

(E) The electric power supplier or basic generation service provider shall provide the documentation required pursuant to (c)2i(1)(B), (C) or (D) above to the Board or its authorized representative upon request.

(2) Electric energy produced from combustion of the following materials shall not qualify as a Class I renewable source that is produced from biomass that is cultivated and harvested in a sustainable manner:

- (A) Treated, painted or chemically coated wood;
- (B) Municipal solid waste;
- (C) Tires;
- (D) Sewage sludge;
- (E) Wood waste, including demolition waste and construction waste, for which there is no documentation that demonstrates that the wood was grown and harvested in accordance with a management plan approved by the environmental agency of the state in which the wood is grown;
- (F) Wood from an old growth forest, including wood from the forest floor; and
- (G) Wood from the harvesting of a standing forest, except for a forest that is part of a bioenergy plantation.

(3) For any category not specifically addressed within (c)2i(1) and (2) above, to determine if electric energy produced from biomass shall qualify as a Class I renewable resource, which is produced from biomass that is cultivated and harvested in a sustainable manner, an electric power supplier or basic generation service provider intending to rely on energy produced from biomass to meet the standards in N.J.A.C. 14:4-8.3 for Class I renewable energy shall seek a determination from the NJDEP as to whether the biomass was cultivated and harvested in a sustainable manner by filing a request with the Board for such determination. At the request of the Board, the NJDEP shall make case-by-case determinations, until such time as the NJDEP issues generic criteria that further defines biomass that is cultivated and harvested in a sustainable manner.

(A) An electric power supplier or basic generation service provider who intends to rely on energy from a biomass facility as Class I renewable energy shall file a request with the Board for a determination as to the

facility's eligibility as soon as possible, but no later than September 30th of the year for which the supplier seeks to use electricity from the facility to meet the requirements herein.

I. This deadline is intended to allow a period of time for the NJDEP to conduct an environmental review of the facility records, and to allow the supplier a reasonable time to comply with the standards after a determination has been made. The NJDEP shall complete its environmental review and make a determination no later than two months after the Board requests the NJDEP to make such a determination pursuant to the request that has been filed with the Board.

ii. For the limited purposes of these interim standards, Class I renewable energy from geothermal technologies means electricity produced by extracting hot water or steam from geothermal reservoirs in the earth's crust and supplied to steam turbines that drive generators to produce the electricity;

3. The amount of energy sold to retail customers in New Jersey during the preceding year that was generated from Class II renewable energy sources, expressed as a number of kilowatt hours, and the percentage of the electric power supplier's or basic generation service provider's total retail sales that this amount represents.

i. For the limited purposes of these interim standards, the NJDEP has determined that only hydroelectric facilities that have a maximum design capacity of 30 megawatts or less shall qualify as Class II renewable energy sources, unless and until the NJDEP has issued more specific criteria that hydroelectric facilities shall meet to ensure that such a facility meets the highest environmental standards;

ii. An electric power supplier or basic generation service provider may not use pumped hydroelectricity to meet either the Class I or Class II renewable energy resource requirements, except to the extent that the pump storage facility is powered by a Class I or Class II renewable energy resource as defined in N.J.A.C. 14:4-8.2.

(1) Use of renewable energy to power a pumped storage hydroelectric facility shall not be construed to exempt the facility, in either its construction or operation, from the obligation to meet all applicable environmental standards and requirements.

iii. For limited purposes of these interim standards, the NJDEP has determined that energy from all resource recovery facilities permitted in New Jersey that comply with all applicable regulations meet the requirements for Class II renewable energy.

iv. Until the final standards are promulgated, an electric power supplier or basic generation service provider intending to rely on energy produced by an out-of-State resource recovery facility as Class II renewable energy shall seek a determination from the NJDEP as to whether the facility meets the highest environmental standards by filing a request with the Board for such determination. The NJDEP shall make case-by-case determinations, unless and until such time as the NJDEP issues generic criteria that defines the highest environmental standards that a resource recovery facility must meet.

(1) At a minimum, a resource recovery facility shall not be deemed to meet the highest environmental standards unless it is in compliance with air pollution control standards of the state in which the facility is located, as well as Federal air pollution control standards.

(2) Where New Jersey has more stringent environmental protection requirements, a resource recovery facility may not be deemed to meet the highest environmental standards unless it is in compliance with the New Jersey requirements; or equivalent or similar standards, such that overall its level of environmental protection is at least comparable to what would be realized under the New Jersey requirements. These requirements may include solid waste management practices, such as source reduction or recycling practices.

v. As mandated by the Act, an electric power supplier or basic generation service provider may not meet these standards through the use of Class II renewable energy that is generated at a facility in a jurisdiction where retail competition is not permitted.

(1) An electric power supplier or basic generation service provider who intends to rely on Class II renewable energy from a resource recovery facility located in a state other than New Jersey, but from a jurisdiction where retail competition exists, shall file a request with the Board for a determination as to the facility's eligibility as soon as possible, but no later than September 30th of the year for which the supplier seeks to use electricity from the facility to meet the requirements herein.

(A) This deadline is intended to allow a period of time for the NJDEP to conduct an environmental review of the facility records, and to allow the supplier a reasonable time to comply with the standards after a determination has been made. The NJDEP shall complete its environmental review and make a determination within no more than two months after the Board requests the NJDEP to make such a determination pursuant to a request that has been filed with the Board;

4. Documentation which demonstrates that the Class I and Class II renewable resources in the electric power supplier's or basic generation service provider's electric energy portfolio were produced by owned generation, or under a bilateral contract or a contract for specified resources between the electricity power supplier or generation service provider and a generating company or between the electricity power supplier or a generation service provider and a wholesale power marketer, in which:

i. Each generating unit used to fulfill these interim standards is specified, including location, fuel and technology type, and any unique State and/or Federal facility or plant identification number;

ii. The operator of the generating unit(s) documents that the specified amount of kilowatt hours from each renewable energy source was generated by and/or sold to the electric power supplier or basic generation service provider;

- iii. Evidence that the specified kilowatt hours flowed into the appropriate PJM ISO or NY ISO control area; and
 - iv. An affidavit from the owner of the specified unit(s) that the renewable energy power was sold once and only once; and
 - 5. If an electric power supplier or basic generation service provider sells electricity in any other state and is subject to renewable energy portfolio requirements in that state, the electric power supplier or basic generation service provider shall list any such requirement and shall indicate how it satisfied those renewable energy portfolio requirements.
 - i. To prevent double-counting the electric power supplier or basic generation service provider shall not satisfy New Jersey's renewable energy portfolio requirements using renewable energy used to satisfy another state's renewable energy portfolio requirements.
- (d) Class I and Class II renewable portfolio percentage requirements cannot be fulfilled by ascribing a portion of spot market purchases as renewable energy.
- 1. To avoid multiple counting of the renewable energy generated, spot market purchases shall not be allowed to fulfill Class I or Class II renewable energy requirements. Because most of the renewable energy claimed by suppliers as fulfilling the interim standards' requirements will be scheduled and delivered into the PJM or NY ISO control area markets, allowing suppliers to rely on a percentage of the spot market average to discharge their renewable energy requirement could result in counting the renewable energy in more than one supplier's energy portfolio.
- (e) In some cases, a single electricity generating source may utilize a combination of energy resources to generate electricity, and these energy resources may fall into more than one of the following categories: "Class I renewables," "Class II renewables" and "other type of energy source." This may occur, for example, when biomass that is cultivated and harvested in a sustainable manner is fired or co-fired in conjunction with natural gas or other energy resources which are not Class I renewable energy resources. In such a case, for the purpose of reporting under N.J.A.C. 14:4-8.4(c)2 and/or 3, the following procedures shall be followed to determine the percentage of an electric power supplier's or basic generation service provider's electricity portfolio that is generated from the Class I or Class II renewable energy resources:
- 1. If the generator is delivering the electricity on a wholesale basis to a single supplier, then the prorated share of the total electricity sold shall be considered Class I renewable energy and/or Class II renewable energy, in proportion to the amount of Class I renewable energy sources and Class II renewable energy sources, expressed in kilowatt hours, that was used to produce the electricity. These prorated amounts shall then be used to determine the percentage of Class I and Class II renewable resources in the supplier's portfolio.
 - 2. If the generator is delivering electricity on a wholesale basis to more than one energy supplier, then one of the following two options is acceptable, provided that a supplier utilizes the same approach in determining its amount of Class I and Class II renewable energy:

i. Unless the contractual arrangements linking the generator and supplier provide otherwise, the amount of Class I and/or Class II renewable energy in the electricity sold to each supplier from this generation source shall be considered to be directly proportional to the amount of Class I and/or Class II renewable energy in the total amount of electricity generated by the generator source, and this amount shall be determined as follows:

(1) Establish the amount of electricity generated from Class I renewable energy sources; from Class II renewable energy sources; and from all non- renewable energy sources expressed as a percent of the total amount of electricity produced by the generator; and

(2) Then multiply these percentages by the amount of electricity delivered to each supplier; or

ii. If the contractual arrangements linking the generator and supplier so provide, the portions of the total amount of electricity generated by the energy source which are Class I and/or Class II renewable energy may be conveyed and assigned to one or more specific suppliers, and the remaining portions of the total amount of electricity generated by the energy source shall be considered not to include any Class I and/or Class II renewable energy. The amounts assigned to each supplier shall be determined as follows; however, the amount of Class I and/or Class II renewable energy from the energy source conveyed to individual suppliers may not exceed, in total, the portion of the energy generated by the source which was produced from Class I and/or Class II renewable energy resources:

(1) Establish the amount of electricity generated from Class I renewable energy sources; from Class II renewable energy sources; and all non- renewable energy sources expressed in kilowatt hours;

(2) Then determine the specific amounts from each category conveyed and assigned to each supplier, so that the sum of electricity from each category sold to each supplier equals the total amount of electricity generated from each category; and

(3) For the purposes of N.J.A.C. 14:4-8.4(e)1 and 2, for electric generation associated with a combustion device, the amount of electricity produced from each fuel source shall be considered to be in proportion to the amount of British thermal units (Btu) of heat input from each kind of fuel burned in the combustion device.

(f) The electric power supplier or basic generation service provider shall identify after the fact, the specific generating unit or units used to supply the renewable energy in its electric energy portfolio (including operating records for owned generation and contracts for purchased power, minus proprietary information such as pricing terms) and shall document that the renewable energy was not sold more than once, as defined in N.J.A.C. 14:4- 8.4(c)4. The electric power supplier or basic generation service provider shall establish either that the Class I and Class II renewable energy was generated and

flowed into the appropriate PJM Interconnection L.L.C. or New York Independent System Operator control area or that the conditions are met as set forth in (f)2 below.

1. Aggregate generation from small renewable energy resources, 100 kilowatts of capacity or less, may be used to meet renewable portfolio requirements, provide that the generators or customer-generator or their agents document the level of generation as recorded by appropriate metering and power sales, on an annual basis;
2. Any renewable energy from small on-site generation not scheduled through the PJM ISO or NY ISO, including on-site small wind or solar photovoltaic generation sources using net metering to record electricity generated from the customer's side of the meter and meeting New Jersey's Interim Net Metering, Safety and Power Quality Standards for Wind and Solar Photovoltaic Systems, N.J.A.C. 14:4-9, may be used to meet these renewable energy portfolio requirements, provided that:
 1. The generation unit is no greater than 100 kilowatts capacity;
 2. The unit is located in New Jersey;
 3. The unit meets the definition of Class I renewable energy as defined herein in N.J.A.C. 14:4-8.2;
 4. The generators or customer-generators or their agents can vary the level of generation, as recorded by appropriate metering, on an annual basis; and
 5. Any credit for Class I renewable energy from such small on-site generation shall comply with the protocol of the renewable energy trading system, including proprietorship of credit, when such program is ordered or adopted by the Board.

(g) If the annual March report demonstrates noncompliance for the preceding calendar year, the electric power supplier or basic generation service provider shall then file quarterly reports beginning in June of that year and in each subsequent calendar year in March, June, September, and December, reporting on the calendar quarter that ended three months previously (that is, a report on the January through March period would be submitted in June) to demonstrate that the electric power supplier or basic generation service provider is making progress in meeting the renewable energy portfolio standards' requirements. The electric power supplier or basic generation service provider shall continue to submit quarterly reports until such time that the supplier or provider of electricity has met the Class I and Class II renewable energy portfolio requirements for one full calendar year. The quarterly reports shall include the same components as required from the annual reports, as described in preceding paragraphs.

(h) Until the final standards are promulgated, the NJDEP and the Board shall continue to consider outstanding environmental issues.

1. The issues shall include, but are not limited to:
 - i. The definition of "highest environmental standards" and specifically, the general criteria that an out-of-State resource recovery facility and hydroelectric facility over 30 mW must demonstrate to be approved as meeting the highest environmental standards;

- ii. The further definition of what constitutes biomass that is cultivated and harvested in a sustainable manner; and
 - iii. The development an implementation of a regional renewable energy trading program.
2. The conclusions reached on these issues shall be included in the final renewable energy portfolio standards. A draft of the final standards shall be offered for public review and comment prior to adoption.

14:4-8.5 Calculation methodology

(a) The actual percentages for Class I and Class II renewable energy sources shall be calculated by dividing the total amount of kilowatt hours of electricity sold to retail customers in New Jersey from each renewable generation class, by the electric power supplier's or basic generation service provider's total retail sales within the State. The percentages generated from a Class I or Class II renewable energy source shall consist of the amount of kilowatt hours generated from a renewable energy source(s) that the electric power supplier or basic generation service provider delivered or caused to be delivered to the appropriate PJM Interconnection, L.L.C. or NY ISO control areas during the preceding calendar year to sell to retail customers in New Jersey.

- 1. Energy under contract or energy from capacity under contract to any customer outside of New Jersey or to any wholesale customer shall not be included in these calculations.

14:4-8.6 Recordkeeping and verification

(a) All documentation pertinent to the requirements in this subchapter shall be subject to audit review by the Board. Each electric power supplier or basic generation service provider shall keep all records pertaining to the requirements contained in this subchapter for a period of five years, including data on kilowatt hours from owned generation, bilateral contracts, and purchases from the wholesale market. Each electric power supplier or basic generation service provider shall make all pertinent records available to the Board for review upon Board request.

(b) Basic generation service providers shall substantiate the cost of renewable energy and submit to the Board such renewable energy supply sources and costs as included in N.J.A.C. 14:4-8.4, and any other data judged pertinent by the Board, in instances of rate proceedings. While recognizing that renewable energy sources have unique attributes, nonetheless, the cost of such energy to be recovered from the ratepayers must be reasonable and prudent.

14:4-8.7 Renewable energy trading program

An electric power supplier or basic generation service provider may satisfy the requirements contained in this subchapter by participating in a renewable energy trading

program at such time as a program is developed and ordered or adopted by the Board, in consultation with the NJDEP.]

14:4-8.3 Minimum percentage of renewable energy required

(a) Each supplier/provider, as defined at N.J.A.C. 14:4-8.2, that sells electricity to retail customers in New Jersey, shall ensure that the electricity it sells each reporting year in New Jersey includes at least the minimum percentage of qualified renewable energy, as defined at N.J.A.C. 14:4-8.2, required for that reporting year from each category specified in Table A below:

Table A
Minimum Percentage Of Renewable Energy – 2004 through 2008

<u>Reporting Year</u>	<u>Solar Electric Generation (solar RECs)</u>	<u>Class I Renewable Energy</u>	<u>Class II Renewable Energy</u>	<u>Total Renewable Energy</u>
<u>2004</u>	<u>0.01%</u>	<u>.74%</u>	<u>2.5%</u>	<u>3.25%</u>
<u>2005</u>	<u>0.017%</u>	<u>0.983%</u>	<u>2.5%</u>	<u>3.5%</u>
<u>2006</u>	<u>0.036%</u>	<u>1.964%</u>	<u>2.5%</u>	<u>4.5%</u>
<u>2007</u>	<u>0.076%</u>	<u>2.924%</u>	<u>2.5%</u>	<u>5.5%</u>
<u>2008</u>	<u>0.16%</u>	<u>3.84%</u>	<u>2.5%</u>	<u>6.5%</u>

(b) The Board shall adopt rules setting the minimum percentages of solar electric generation, class I renewable energy, and class II renewable energy required for reporting year 2009 and each subsequent reporting year. These minimum percentages shall be no lower than those required for reporting year 2008 in Table A above. Each of the rules setting such minimum percentage shall be adopted at least two years prior to the minimum percentage being required.

(c) A supplier/provider shall meet the requirements for solar electric generation in Table A above through submittal of solar RECs, or through submittal of one or more SACPs, as those terms are defined at N.J.A.C. 14:4-8.2.

(d) A supplier/provider may choose to meet the class I and class II renewable energy requirements in Table A above through supplying renewable energy or through the use of RECs in accordance with N.J.A.C. 14:4-8.8. However, class I and II renewable energy RECs shall be used only after the GATS system is operational and the Board has authorized such use by Board order.

(e) If a supplier/provider complies with this subchapter by directly supplying class I and/or class II renewable energy to customers, the energy shall be supplied to customers during the reporting year.

(f) A supplier/provider may, in lieu of meeting the requirements in Table A above, comply with this subchapter by submitting the appropriate number of ACPs or SACPs, in accordance with N.J.A.C. 14:4-8.10.

(g) The following shall apply to the type of energy used for compliance with each of the requirements in Table A above:

1. Solar RECs may be used to meet any requirement in Table A, whether the requirement is for solar electric generation, class I renewable energy, or class II renewable energy;
2. Direct supply of solar electric generation may be used to meet class I or class II renewable energy requirements, but shall not be used to meet solar electric generation requirements;
3. Class I renewable energy may be used to meet class I renewable energy requirements or class II renewable energy requirements, but shall not be used to meet solar electric generation requirements; and
4. Class II renewable energy shall be used only to meet class II renewable energy requirements, and shall not be used to meet solar electric generation requirements or class I renewable energy requirements.

14:4-8.4 Compliance with solar electric generation requirements

(a) The requirements in Table A for solar electric generation shall be met through the submittal of solar RECs, as defined at N.J.A.C. 14:4-8.2; or submittal of SACPs in accordance with N.J.A.C. 14:4-8.10. Direct supply of solar electric generation may be used to meet class I renewable energy requirements, but shall not be used to meet the solar electric generation requirements in Table A.

(b) A supplier/provider shall not use a solar REC that was issued based on energy used to satisfy another state's renewable energy portfolio requirements for compliance with the requirements at N.J.A.C. 14:4-8.3 for solar electric generation.

14:4-8.5 Compliance with class I renewable energy requirements

(a) This section sets forth the types of energy that qualify as class I renewable energy for the purposes of this subchapter. The Board has determined that energy listed at (b) below qualifies as class I renewable energy, with no prior approval required. Energy listed at (d) and (e) below shall qualify as class I renewable energy if the conditions specified in those subsections are met.

(b) The following qualify as class I renewable energy for the purposes of this subchapter, with no prior approval required:

1. Solar electric generation, either in the form of solar RECs or as direct supply to customers;
2. Electricity derived from wind energy;
3. Electricity derived from wave or tidal action;
4. Electricity that is geothermal energy, as defined in N.J.A.C. 14:4-8.2;
5. Electricity generated by the combustion of methane gas captured from a landfill;
6. Electricity generated by a fuel cell powered by methanol, ethanol, landfill gas, digester gas, biomass gas, or other renewable fuel. Electricity generated by a fuel cell powered by a fossil fuel shall not qualify as class I renewable energy for the purposes of this subchapter;
7. Electricity generated by the combustion of gas from the anaerobic digestion of food waste and sewage sludge at a biomass generating facility;
8. Electricity generated through a class I renewable energy project funded by the societal benefits charge, as defined at N.J.A.C. 14:4-8.2; and
9. Electricity generated through a project funded through the Board's Clean Energy Program.

(c) For purposes of this section, the term "combustion of biomass" includes both the burning of captured methane gas derived from biomass, as well as the direct firing of biomass.

(d) Electricity produced through combustion of the following types of biomass shall qualify as class I renewable energy, provided that the NJDEP provides Board staff with a biomass sustainability determination for the biomass in accordance with (f) and (g) below:

1. A bioenergy crop, as defined at N.J.A.C. 14:4-8.2, including wood produced at a biomass energy plantation;
2. Wood from the thinning or trimming of trees and/or from a forest floor, provided that the wood is not old-growth timber, as defined at N.J.A.C. 14:4-8.2; and that the wood is unadulterated by non-cellulose substances or material;
3. Gas generated by anaerobic digestion of biomass fuels other than food waste and sewage sludge, including bioenergy crops and agricultural waste; and
4. Either of the following types of wood, provided that the wood is unadulterated by non-cellulose substances or material:
 - i. Ground or shredded pallets or other scrap wood, with all nails and other metal removed, produced at a facility that is classified as a Class B recycling facility by the New Jersey Department of Environmental Protection's Bureau of Landfill and Recycling Management, or at an equivalent recycling facility approved by the state environmental agency in which the facility is located; or
 - ii. Wood shavings and/or scrap from a lumberyard or a paper mill, excluding black liquor, as defined at N.J.A.C. 14:4-8.2.

(e) Electricity produced through combustion of a type of biomass not described in this section may qualify as class I renewable energy for the purposes of this subchapter, provided that the NJDEP provides Board staff with a biomass sustainability determination for the biomass in accordance with (f) and (g) below.

- (f) To support a biomass sustainability determination, a supplier/provider shall demonstrate all of the following:
1. The generation facility meets NJDEP requirements for state of the art (SOTA) air pollution control at N.J.A.C. 7:27-8;
 2. The generation facility's ash management practices comply with NJDEP requirements; and
 3. All plant matter used directly as biomass fuel was cultivated and harvested in a sustainable manner, in accordance with a management plan approved by the state environmental agency or agricultural agency in the state in which the plant was grown. If the plant matter is not used directly as biomass fuel, but is subject to alteration after its harvest and before its use as biomass fuel, this determination is not required.
- (g) To obtain a biomass sustainability determination, a supplier/provider shall submit a request for the determination, including any documentation required by NJDEP. The request shall be submitted to the NJBPU Office of Clean Energy, P.O. Box 350, Trenton, New Jersey 08625. The supplier/provider shall simultaneously provide a copy of the request to the NJDEP's Office of Innovative Technology, P.O. Box 409, Trenton, New Jersey 08625.
- (h) If a biomass sustainability determination is required for class I renewable energy used to comply with this subchapter, the determination shall be submitted with the annual report required under N.J.A.C. 14:4-8.11. If the determination is not submitted with the annual report, the energy shall not qualify for use to comply with this subchapter, and RECs or ACPs shall be submitted to make up the shortfall. A determination submitted to board staff after the due date of the annual report shall not be accepted, and the electricity shall not be counted towards the supplier/provider's compliance with this subchapter.
- (i) A supplier/provider that uses electricity generated through use of biomass to comply with this subchapter shall maintain documentation that the biomass meets the requirements of this section. If the supplier/provider obtained a NJDEP biomass sustainability determination, the supplier/provider shall maintain the request for the determination and all supporting documentation on file for five years, and shall produce that documentation upon request by the Board or its designee. In addition, the supplier/provider shall annually provide to the Board an affidavit from the operator of the generating facility, certifying that the generating facility continues to operate in conformity with the request and documentation originally provided.
- (j) If a generating facility that uses biomass that is covered by a NJDEP biomass sustainability determination, and there is a change in the operation of the facility or in the composition of the biomass used as fuel, including in its cultivation and harvesting, the supplier/provider shall submit a new biomass sustainability determination to the Board as part of the annual report required under N.J.A.C. 14:4-8.11. Failure to submit this

information shall disqualify the electricity produced by the facility from use as class I renewable energy as of the date the change was made.

(k) Electricity produced through combustion of the following substances shall not qualify as class I renewable energy for the purposes of this subchapter:

1. Treated, painted or chemically coated wood;
2. Municipal solid waste;
3. Tires;
4. Sewage sludge;
5. Wood waste, including demolition waste and construction waste;
6. Old-growth timber, as defined at N.J.A.C. 14:4-8.2; and
7. Wood harvested from a standing forest, except for a forest that is part of a bioenergy plantation.

14:4-8.6 Compliance with class II renewable energy requirements

(a) This section sets forth the types of energy that qualify as class II renewable energy for the purposes of this subchapter. The Board has determined that energy listed at (b) below qualifies as class II renewable energy, with no prior approval required. Energy described at (c) below shall qualify as class II renewable energy if the conditions specified in (c) are met.

(b) The following qualify as class II renewable energy for the purposes of this subchapter:

1. Electricity generated by a hydroelectric facility that has a maximum design capacity of 30 megawatts or less from all generating units combined; and
2. Electricity generated by a resource recovery facility located in New Jersey, covered by all required NJDEP approvals, and operating in compliance with all applicable New Jersey environmental laws.

(c) Electricity generated by a resource recovery facility located outside of New Jersey shall qualify as class II renewable energy if both of the following criteria are met:

1. The facility is located in a state with retail competition, as defined at N.J.A.C. 14:4-8.2; and
2. NJDEP makes an environmental compliance determination, stating that the facility meets or exceeds all NJDEP requirements that would apply to the facility if it were located in New Jersey, or meets equivalent environmental requirements.

(d) To obtain a NJDEP environmental compliance determination for a resource recovery facility, a supplier/provider shall submit a request for the determination, including the documentation listed at (e) below, to the NJBPU Office of Clean Energy, P.O. Box 350, Trenton, New Jersey 08625. The supplier/provider shall simultaneously provide a copy of the request to the NJDEP's Office of Innovative Technology, P.O. Box 409, Trenton, New Jersey 08625.

(e) A request for an environmental compliance determination regarding a resource recovery facility shall include all information required by NJDEP, including but not limited to the following:

1. The most recent stack test data reports, or summary reports, for all criteria pollutants emitted by the facility, including any stack test data for mercury emissions from the facility. If stack test data are available on a quarterly basis, the most recent four quarters shall be submitted. These data, if available, should provide, at a minimum, the mercury inlet and outlet concentration for each unit, in addition to the percent removal;
2. A description of the municipal solid waste (MSW) recycling program in the jurisdictions that provide solid waste to the facility, including any solid waste from an industry source. This description shall state the entities that administer the recycling program(s), the percentage of MSW provided through local government contracts and/or agreements, the company providing any industry source MSW, and the amount of solid waste purchased on the spot market, if any; and
3. Residual ash testing data from the most recent 12 month period, including data reports or summary reports for total metals, Toxicity Characteristic Leaching Procedure (TCLP), or other leveling tests performed, and the total amount of tetrachlorodibenzo-p-dioxins (TCDD) in the ash.

(f) If an environmental compliance determination is required for electricity to qualify as class I renewable energy, the determination shall be obtained prior to generating the electricity. If a supplier/provider delivers electricity generated at a facility that requires an NJDEP environmental compliance determination, but did not obtain such a determination prior to the generation of that electricity, the electricity shall not be counted towards the supplier/provider's compliance with this subchapter.

(g) A supplier/provider that uses electricity generated from a resource recovery facility to comply with this subchapter shall:

1. Maintain documentation showing that the facility meets the requirements of this section; and
2. If the supplier/provider obtained a NJDEP environmental compliance determination, the supplier/provider shall:
 - i. Maintain the request submitted to NJDEP for the environmental compliance determination and all supporting documentation on file for five years;
 - ii. Produce the request and documentation upon request by the Board or its designee; and
 - iii. Annually provide to the Board an affidavit from the operator of the resource recovery facility, certifying that the facility has not violated its federal or state environmental permits in the previous year, and continues to operate in conformity with the request and documentation originally provided to NJDEP.

(h) If there is a change in the operation of a resource recovery facility or in the composition of its fuel, the supplier/provider shall submit the following information to the Board within 30 days after the change is made. Failure to submit the following shall

disqualify the electricity produced by the facility from use as class II renewable energy as of the date of the change:

1. Documentation demonstrating that, after the change, the resource recovery facility continues to meet the requirements of this section for class II renewable energy; and
2. In the case of a facility covered by a NJDEP environmental compliance determination, a new determination shall be obtained from NJDEP and filed with the Board.

(i) In addition to the other types of energy that qualify as class II renewable energy under this section, any energy that qualifies as class I renewable energy under N.J.A.C. 14:4-8.4 may be used to satisfy the requirements for class II renewable energy.

14:4-8.7 Requirements that apply to both class I and class II renewable energy

(a) To qualify as class I or class II renewable energy for the purposes of this subchapter, energy shall meet the requirements in N.J.A.C. 14:4-8.5 and 8.6, and in addition shall meet the requirements of this section.

(b) To qualify as class I or class II renewable energy for the purposes of this subchapter, energy shall be generated within or delivered into the PJM region, as defined in N.J.A.C. 14:4-8.2. Energy shall be considered delivered into the PJM region if it complies with the energy delivery rules established by PJM Interconnection.

(c) If class I or class II renewable energy is generated outside of the PJM region, as it was configured on January 1, 2003, but was delivered into the PJM region, the energy may be used to meet the requirements of this subchapter only if the energy was generated at a facility that commenced construction on or after January 1, 2003.

(d) A supplier/provider shall not use energy used to satisfy another state's renewable energy portfolio requirements for compliance with the class I or class II renewable energy requirements at N.J.A.C. 14:4-8.3.

14:4-8.8 Renewable Energy Certificates (RECs)

(a) A supplier/provider may choose to submit one or more Renewable Energy Certificates, or RECs, as defined in N.J.A.C. 14:4-8.2, in lieu of supplying the percentage of renewable energy required under Table A in N.J.A.C. 14:4-8.3. A supplier/provider that wishes to use RECs to comply with this subchapter shall meet the requirements of this section.

(b) If a supplier/provider complies with this subchapter by submitting RECs, the RECs shall be based on energy that was generated during the reporting year, even if the RECs themselves are not issued until after the reporting year.

(c) Until issuance of a Board order that specifies otherwise, the only RECs that may be used to comply with this subchapter are solar RECs. Once the GATS system is operational and PJM Interconnection begins issuing class I and class II RECs, the Board may issue an order approving use of class I and class II RECs issued by PJM Interconnection for compliance with this subchapter.

(d) Once a REC has been submitted for compliance with this subchapter, the REC shall be permanently retired and shall not be used again.

14:4-8.9 Board issuance of solar RECs

(a) The Board or its designee shall issue solar RECs for use in complying with this subchapter, in accordance with this section. Once the GATS system is operational and PJM Interconnection begins issuing solar RECs, the Board may issue an order approving use of solar RECs issued by PJM Interconnection for compliance with this subchapter.

(b) The Board or its designee shall issue solar RECs only for solar electric generation that takes place after May 31, 2004.

(c) In determining the number of solar RECs to issue, the Board or its designee shall use either of the following measurement methods, as applicable:

1. Monthly readings of an electric revenue meter that records megawatt-hour production of electrical energy. The readings may be taken by any person, but shall be verified by the Board or its designee; or
2. For a solar generating system with a capacity of less than 10 kilowatts, annual engineering estimates and/or monitoring protocols approved by the Board. The Board shall post acceptable estimation methodologies and monitoring protocols on its website at www.bpu.state.nj.us, within 90 days after {effective date of these rules}.

(d) The Board or its designee shall issue solar RECs in whole units, each representing the environmental attributes of one megawatt-hour of solar electric generation.

(e) A request for issuance of a solar REC shall be submitted to the Board on a form posted on the Board's website at www.bpu.state.nj.us. The Board shall require submittal of information and certifications needed to enable the Board or its designee to verify the generation that forms the basis of the requested RECs. The Board shall require inspections of generation equipment, monitoring and metering equipment, and other facilities relevant to verifying solar electric generation. The Board shall impose application fees, inspection fees, and/or other charges for work required to verify solar electric generation and issue RECs.

(f) Each REC shall include the following:

1. The date upon which or period during which the electricity was generated;
2. The date upon which the REC was issued;

3. A unique tracking number, assigned by the issuer of the REC; and
4. An expiration date which is one year after the date upon which the certificate was issued.

(g) The Board or its designee shall not issue a solar REC based on solar electric generation described at N.J.A.C. 14:4-8.4(b).

14:4-8.10 Alternative compliance payments (ACPs and SACPs)

(a) A supplier/provider may choose to submit one or more alternative compliance payments (ACPs) or solar alternative compliance payments (SACPs), as those terms are defined in N.J.A.C. 14:4-8.2, in lieu of supplying the percentage of renewable energy required under Table A in N.J.A.C. 14:4-8.3. A supplier/provider that wishes to use ACPs or SACPs to comply with this subchapter shall meet the requirements of this section.

(b) The President of the Board shall appoint an ACP advisory committee to provide recommendations to the Board regarding the appropriate cost of ACPs, as well as other characteristics of their use. The Board shall consider the advisory committee's recommendation and shall, through Board order, set prices for ACPs and SACPs. At a minimum, the price of an ACP or an SACP shall be higher than the estimated competitive market cost of the following:

1. The cost of meeting the requirement through purchase of a REC or solar REC; or
2. The cost of meeting the requirement through generating the required renewable energy.

(c) The Board shall adjust the amount of ACPs and SACPs at least once per year, in consultation with the ACP advisory committee, as needed to comply with (b)1 and 2 above and to reflect changing conditions in the environment, the energy industry, and markets.

(d) To comply with this subchapter using ACPs or SACPs, a supplier/provider shall submit the following to the Board, as applicable:

1. One ACP for each megawatt-hour of class I or class II renewable energy required; or
2. One SACP for each megawatt-hour of solar electric generation required.

(e) The Board shall use the ACP monies submitted to meet the requirements of this subchapter to fund renewable energy projects through the Clean Energy Program. The Board shall use SACP monies to fund solar energy projects through the New Jersey Clean Energy Program.

14:4-8.11 Demonstrating compliance, reporting and record keeping

(a) By September 1st of each year, each supplier/provider shall file an annual report with the Board, demonstrating that the supplier/provider has met the requirements of this

subchapter for the preceding reporting year (that is, for the reporting year ending May 31st of the same calendar year).

(b) If the annual report required under (a) above does not demonstrate that the supplier/provider has supplied the energy required under Table A for the previous reporting year, the annual report shall be accompanied by RECs, solar RECs, ACPs and/or SACP in sufficient quantities to make up the shortfall.

(c) The annual report shall contain the following basic information for the preceding reporting year:

1. The total number of megawatt hours of electricity sold to retail customers in New Jersey;
2. The total number of megawatt hours of electricity sold to retail customers in New Jersey that qualify as class I renewable energy under N.J.A.C. 14:4-8.4;
3. The percentage of the supplier/provider's total New Jersey retail sales that the amount set forth under (c)2 above represents;
4. The total number of megawatt hours of electricity sold to retail customers in New Jersey that qualify as class II renewable energy under N.J.A.C. 14:4-8.5;
5. The percentage of the supplier/provider's total New Jersey retail sales that the amount set forth under (c)4 above represents;
6. The total number of megawatt hours of electricity sold to retail customers in New Jersey that qualify as solar electric generation under N.J.A.C. 14:4-8.4;
7. The percentage of the supplier/provider's total retail sales that the amount in (b)6 above represents;
8. The total amount of solar electric generation, class I renewable energy, and class II renewable energy represented by RECs submitted with the annual report;
9. The total number of ACPs and/or SACP submitted with the annual report; and
10. A summary demonstrating how compliance with the requirements in Table A have been achieved.

(d) The documentation required under (c) above shall include the following:

1. Identification of each generating unit, including its location, fuel and technology type, and any unique State and/or Federal facility or plant identification number;
2. An affidavit from the operator of each generating unit that the specified amount of megawatt hours from each renewable energy source was generated by and/or sold to the supplier/provider and that the supplier/provider has sole and exclusive title to the renewable energy and has not been used to meet the RPS energy requirements in any other state or jurisdiction; and
3. An affidavit from the supplier/provider that the specified megawatt hours were delivered into the PJM region and complied with PJM Interconnection energy delivery rules.

(e) Once the GATS system is operational, the documentation required under (c) above shall include an accounting issued by PJM Interconnection that shows the number of RECs purchased and/or held by the supplier/provider.

(f) Failure of a supplier/provider to demonstrate compliance with this subchapter in accordance with this section, within the deadlines set forth in this section, shall subject the supplier/provider to penalties under N.J.A.C. 14:4-8.12.

(g) Each supplier/provider shall keep all records pertaining to the requirements in this subchapter for a period of five years, including data on megawatt hours resulting from owned generation, contracts, purchases from the wholesale market, and purchases of RECs. Each supplier/provider shall make all pertinent records available for review upon request by the Board or its designee.

(h) Upon the implementation of the GATS system, the Board may modify the reporting requirements in this section as necessary to facilitate implementation of the GATS system. Any such modification shall be accomplished through a Board order or by rulemaking.

[14:4-8.8] 14:4-8.12 Penalties

(a) If an electric power supplier or basic generation service provider fails to meet the requirement for renewable sources of energy set forth in N.J.A.C. 14:4-8.3 for any given year, then such electric power supplier or basic generation service provider shall be required to make up the amount of kilowatt hours in arrears during the succeeding calendar year. Thus, in the following calendar year immediately after the failure to meet the renewable energy portfolio standards' requirement, the amount of kilowatt hours from renewable energy required in the electric energy portfolio of such electric power supplier or basic generation service provider shall be the amount of kilowatt hours set forth for that year in N.J.A.C. 14:4-8.3 plus the amount of kilowatt hours in arrears from the previous calendar year. Documentation that the arrearage has been met shall be included in the quarterly reports as filed with the Board, as required in N.J.A.C. 14:4-8.4.

(b) The failure of an electric power supplier or basic generation service provider that is in arrears to meet the minimum renewable energy portfolio standards' requirement in any year plus compensate for any arrearage that the electric power supplier or basic generation service provider is carrying forward from the preceding calendar year shall constitute a violation, which shall be referred by Board staff to the Board for its consideration. Where applicable and appropriate, the Board shall consult the Attorney General and the NJDEP with respect to these referrals.

1. Any party determined by the Board, after notice and hearing, to have violated any provision of these interim standards relating to the renewable energy portfolio standards' requirements may be subject to any one or more of the following penalties, as consistent with provisions of the Act:]

(a) Failure to comply with any provision of this subchapter shall subject the violator to the following penalties in accordance with the Board's regulatory and statutory authority:

- [i.] 1. Suspension or revocation of the electric power supplier's license;
- [ii.] 2. Financial penalties;
- [iii.] 3. Disallowance of recovery of costs in rates; and

[iv.] 4. Prohibition on accepting new customers.

[(c)] (b) In determining the appropriate sanction, the Board shall consider the following criteria and any other factors deemed appropriate and material to the electric power supplier's or basic generation service provider's failure to comply:

1. The good faith efforts, if any, of the entity charged in attempting to achieve compliance;
2. The gravity of the violation or failure to comply with the requirements in this subchapter;
3. The number of past violations by the entity charged regarding these interim standards and other standards adopted by the Board; and
4. The appropriateness of the sanction or fine to the size of the company charged.